



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/715,069	11/17/2003	Bernhard Stellwag	MOH-P010057	3307

24131 7590 08/05/2004
LERNER AND GREENBERG, PA
P O BOX 2480
HOLLYWOOD, FL 33022-2480

EXAMINER

RICHARDSON, JOHN A

ART UNIT PAPER NUMBER

3641

DATE MAILED: 08/05/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/715,069

Applicant(s)

STELLWAG ET AL.

Examiner

John Richardson

Art Unit

3641

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 17 November 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-7 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 11-17-2003.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Non Final Rejection

1). The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2). The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3). The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Art Unit: 3641

4). The disclosure is objected to because of the following informalities:

- Figure 2, abscissa units missing; if these are intended to be straight ratios so state.
- Specification, page 6, line 10, refers to terms in the form of adjectives **bright** surfaces and **native** oxide layer, and it is not clear from the application as to what these terms refer and to how such limitations can be measured.
- The application uses the measurement for concentration of **μmole / kilogram**; these terms should be provided with conversion to the more conventional terms for concentration of **parts-per-million (ppm) by weight**.

Appropriate correction is required.

5). Claims 1 to 7 are objected to because of the following informalities:

- Claim 1, line 11, refers to terms in the form of adjectives **bright** surfaces and **native** oxide layer, and it is not clear from the application disclosure as to what these terms refer and to how such limitations can be measured.

Appropriate correction is required.

Art Unit: 3641

6). Claims 1 to 7 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

There is no adequate description nor enabling disclosure of how and in what manner the limitations of the terms **bright** surfaces and **native** oxide layer are to be interpreted, and it is not clear from the application as to what these terms refer and to how such limitations can be measured. For example, does the term **bright** imply a level of surface reflection relative to some standard surface, and does the **native oxide layer** imply the in-situ component surface oxide layer prior to the start of the injection process. Note that a disclosure in an application, to be complete, must contain such description and detail as to enable any person skilled in the art or science to which the invention pertains to make and use the invention as of its filing date, In re Glass, 181 USPQ 31.

7). Claims 1 to 7 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The limitation in claim 1, lines 7-8, **of feeding (any) – (emphasis added) alcohol into the primary coolant to establish an alcohol concentration of from 0.1 to 300 μ mole / kilogram**, and the limitation in claim 5, lines 1-2, of **wherein the alcohol is selected**

Art Unit: 3641

from a group consisting of methanol, ethanol, and propanol. These limitations are broader than the enabling disclosure, see for example, specification 8, lines 5-7.

8). Claims 1 to 4 are rejected under 35 U.S.C. 102(b) as being anticipated by SU-653953.

The reference provided by the applicant's Information Disclosure Statement discloses a system for injecting alcohol into coolant of a nuclear reactor in the range of 0.1 to 300 μ mole / kilogram that read on the cited claim limitations and comprises a structure for feeding the said alcohol into the primary coolant system of a light-water nuclear power reactor in a manner being claimed in the applicant's invention.

9). Claims 1, 3 to 7 are rejected under 35 U.S.C. 102(b) as being anticipated by Hettiarachchi (U.S. 5,818,893).

The reference discloses a method for reducing corrosion on metal components in the wetted area of a boiling water nuclear reactor system (see for example, Figure 1) comprising feeding alcohol, ethanol, $\text{CH}_3\text{CH}_2\text{OH}$, molecular weight 46.07 in a range of concentration with respect to the reactor coolant that reads on the cited range of concentration of 0.1 to 300 μ mole / kilogram (it is noted that equal volumes of liquids

Art Unit: 3641

contain the same number of molecules based on Avogadro Number of 6.02×10^{23} atoms per mole) as stated in Column 9, lines 55+, relating to 3, the reference discloses protecting the said wetted components against stress corrosion cracking (SCC) as stated in for example Column 1, lines 44+, relating to claim 4, the reference discloses an injection position in the feedwater / condensate return to the reactor pressure vessel (item 43), relating to claim 5, the reference discloses an ethanol injection source (Column 9, lines 55+), relating to claims 6-7, the reference discloses the use of platinum doping (Column 10, lines 43-65).

10). The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

11). Any inquiry concerning this communication or earlier communications from the examiner should be directed to John Richardson whose telephone number is (703) 305 0764. The examiner can normally be reached on Monday to Thursday from 7.00 AM to 4.30 PM. The examiner can also be reached on alternate Fridays.

Art Unit: 3641

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael Carone, can be reached on (703) 306 4198. The fax phone number for the organization where this application or proceeding is assigned is (703) 305 7687.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 308 1113.

John Richardson, PE,

July 29 2004.

3641
JACK KEITH
PRIMARY EXAMINER